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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/389,720	09/03/1999	BRENTON L. DICKEY	MICRON.086A/	5782

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EXAMINER

MITCHELL, JAMES M

ART UNIT PAPER NUMBER

2827

DATE MAILED: 08/01/2002

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

09/389,720

Applicant(s)

DICKEY, BRENTON L.

Examiner

James Mitchell

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 14 March 2002.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 20-24, 26, 27, 29 and 30 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 20-24, 26, 27, 29 and 30 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) ☐ The proposed drawing correction filed on _____ is: a) ☐ approved b) ☐ disapproved by the Examiner.
If approved, corrected drawings are required in reply to this Office action.
- 12) ☐ The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. §§ 119 and 120

- 13) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
* See the attached detailed Office action for a list of the certified copies not received.
- 14) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).
a) ☐ The translation of the foreign language provisional application has been received.
- 15) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892) 4) ☐ Interview Summary (PTO-413) Paper No(s). _____
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948) 5) ☐ Notice of Informal Patent Application (PTO-152)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449) Paper No(s) _____ 6) ☐ Other: _____

DETAILED ACTION

1. This office action is in response to the amendment filed December 12, 2001.

Specification

2. The disclosure is objected to because of the following informalities: there appears to be a typographical error in the word "polymide" in claim 26.

Appropriate correction is required.

Claim Rejections - 35 USC § 102

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

3. Claims 20-23, 26, 27, 29 and 30 are rejected under 35 U.S.C. 102(b) as being anticipated Marutsuka (JP 358178544).
4. Marutsuka (Fig.1-3) discloses a polyimide film (10) including a plurality of substrate units (defined as the area where die is mounted) adapted to electrically interface with a LOC die (not labeled; Jap, P.186, Lower Rt. Col.) wherein each said unit is on said film between a pair of flanking slots (area between 15 defining a slot; and slot 13) extends such that it is in contact with a side rail (end of slot touching horizontal portion of carrier) of carrier (16), and said slot is placed only in an area where the assembly is to be cut, said carrier in mechanical communication with said film at selected regions of said film that inherently provides enhanced rigidity (frame consisting of Copper, Jap P.186, Top Rt. Col.), a substrate set defined by a group of three substrate units with a plurality of crossbars (lateral region of carrier next to slots); wherein each unit has a central area shown as unfilled within the frame therefore it

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forms a cavity (defined by frame formed on substrate); and each unit includes a pair of adhesive tabs (inherent in bonding of metal to substrate); said units include a plurality of alignment holes (15).

5. Claims 20-24, 27, 29 and 30 are rejected under 35 U.S.C. 102(b) as being anticipated Nakashima et al. (U.S 5,661,086).

6. Nakashima (Fig. 4, 6, 7) discloses a film (12) including a plurality of substrate units (11) adapted to electrically interface with a LOC die (14) wherein each said unit is on said film between a pair of flanking slots (34a) extends such that it is in contact with a side rail (end of slot touching horizontal portion of carrier) of carrier (41), and said slot is placed only in an area where the assembly is to be cut, said carrier in mechanical communication with said film at selected regions of said film that inherently provides enhanced rigidity by being sized and configured to add material at selected regions, a substrate set defined by a group of three substrate units with a plurality of crossbars (lateral region of carrier next to slots); wherein each unit has a substantially central cavity (shown in Fig 4); and each unit includes a pair of adhesive tabs (15); said units include a plurality of alignment holes (30).

Conclusion


7. Any inquiry concerning this communication or earlier communications from the examiner should be directed to James Mitchell whose telephone number is (703) 305-0244. The examiner can normally be reached on M-F 10:30-8:00.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, David L. Talbott can be reached on (703) 305-9883. The fax phone

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numbers for the organization where this application or proceeding is assigned are (703) 305-3432 for regular communications and (703) 305-3230 for After Final communications.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (703) 308-0956.


jmm
July 26, 2002

DAVID E. GRAYBILL
PRIMARY EXAMINER

